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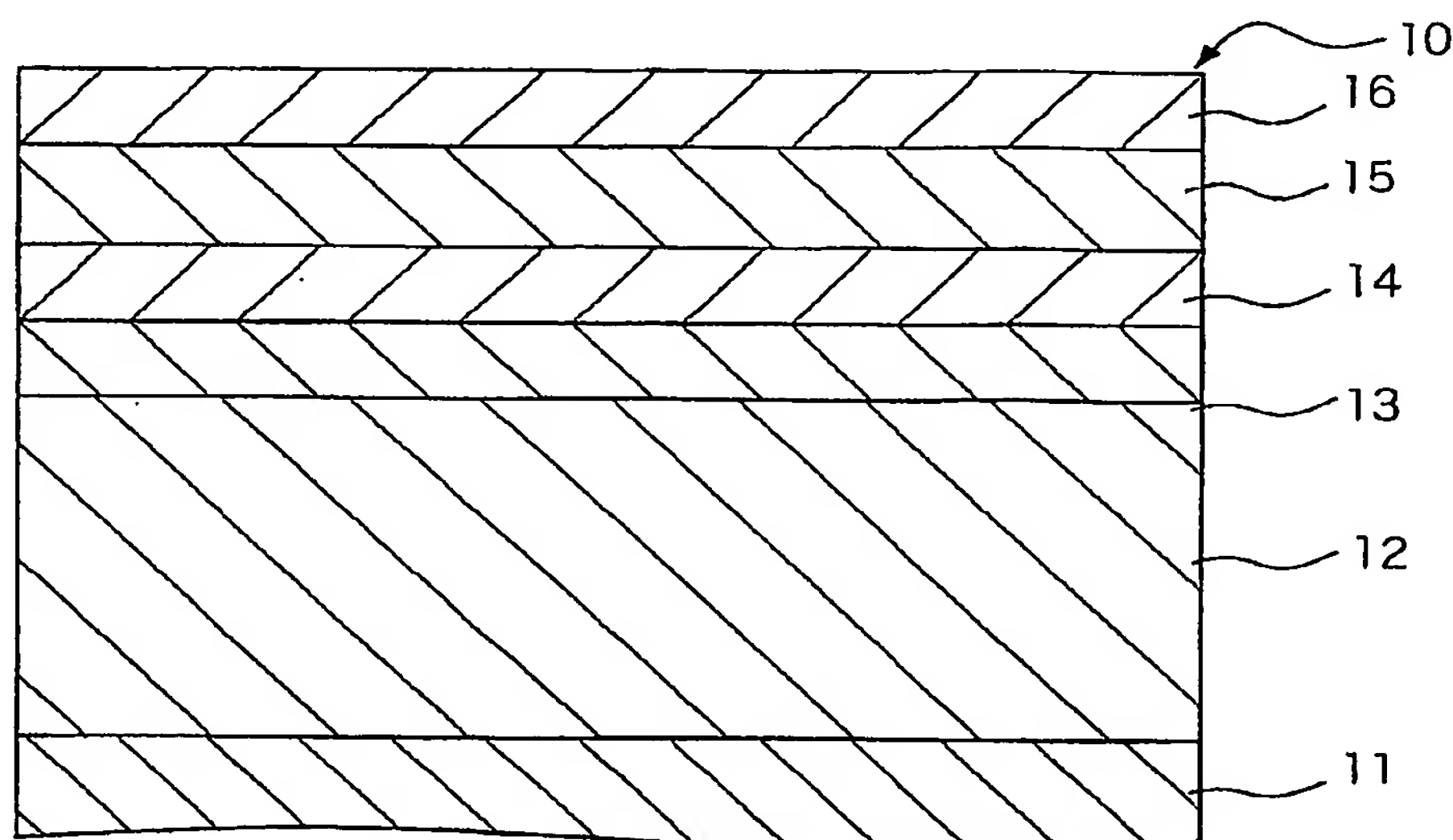
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[Continued on next page]

(54) Title: PERPENDICULAR MAGNETIC RECORDING MEDIUM, MANUFACTURING METHOD THEREFOR, AND MAGNETIC READ/WRITE APPARATUS USING THE SAME



(57) Abstract: A perpendicular magnetic recording medium includes: a substrate; at least one underlayer formed above the substrate; and a perpendicular magnetic recording layer formed above the at least one underlayer, an easy magnetization axis of the perpendicular magnetic recording layer being oriented perpendicular to the substrate, the perpendicular magnetic recording layer including magnetic crystal particles and grain boundaries surrounding the magnetic crystal particles, wherein the grain boundaries contain an oxide of silicon and at least one element selected from the group consisting of Li, Na, K, Rb, Cs, Ca, Sr, and Ba, and the ratio of a total amount of substance of Si, Li, Na, K, Rb, Cs, Ca, Sr, and Ba in the perpendicular magnetic recording layer is no less than 1 mol% and no more than 20 mol%.



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